

ATTACHMENT 3
MISSOURI AMBULANCE REPORTING SYSTEM
DETAILED INSTRUCTIONS

1. **Date of Run**

Definition: Date responding ambulance is notified by EMS dispatch.

Discussion and Justification: Permits planning of EMS resources by day of week or season of year. Also permits assessment of EMS responsiveness. This is almost always the same date as the date incident was reported.

Format: For example, January 1, 1999, would be entered into the boxes provided as 01011999.

2. **Ambulance Service Number**

Definition: License number assigned to your ambulance service by the Unit of EMS.

Format: For example, the Adair County Ambulance District would enter 001005 into the boxes provided.

3. **Vehicle Identification Number**

Definition: Number that identifies the vehicle responding to an incident.

Discussion and Justification: Identifies a specific vehicle. Can be used to construct reports which are specific to a vehicle. Particularly valuable for local reporting.

Format: Enter the four digit number assigned to that specific ambulance vehicle the ambulance service, into the boxes provided.

4. **Ambulance Service Name**

Definition: Name of ambulance service as it appears on the license issued by the Unit of EMS.

Format: Enter the name of the ambulance service on the line provided.

5. **Address (name of hospital, nursing home or clinic) - Location of pickup**

Definition: Address (or best approximation) where patient was found, or, if not patient, address to which unit responded.

Discussion and Justification: Provides location of incident, which can be used to determine the appropriate level of EMS resources for specific areas.

Format: If a hospital, nursing home or clinic enter the name on the line provided. If a motor vehicle collision MVC, enter the street or highway number or name and other descriptors such as mile marker. If other than medical facility or MVC, enter the street address.

6. **City - Location of Pickup**

Definition: City or township (if applicable) where patient was found or to which unit responded (or best approximation).

Discussion and Justification: Provides city location of incident, which can be used to determine the appropriate level of EMS resources for specific areas. In addition, this field may facilitate the linkage to crash reports from the same city, or to hospitals within the same city. Field may be used for local city reports, permitting local understanding of the impact of EMS.

Format: Enter the name of the city or township on the line provided.

7. **County - Location of Pickup**

Definition: County where patient was found or to which unit responded (or best approximation).

Discussion and Justification: Provides county location of incident, which can be used to determine the appropriate level of EMS resources for specific areas. In addition, this field may facilitate probabilistic linkage to crash reports from the same county, or to hospitals within the same county. Field may be used for local county reports, permitting local understanding of the impact of EMS. Can link data file with census data to determine effects of population density, socioeconomic information, etc. on need for EMS and evaluations of EMS outcome.

Format: Enter the name of the county on the line provided. St Louis City also has the status of a county so anyone picked up in the city limits of St. Louis City should enter St. Louis City also as the name of the county.

8. **State - Location of Pickup**

Definition: State where patient was found or to which unit responded.

Discussion and Justification: Provides a means of aggregating EMS incidents by state, which allows reports to state legislatures concerning statewide EMS activities. Can be used to assess statewide resource requirements for EMS operations. Important where patients are transported across State lines.

Format: Enter the two digit initials for the State. Missouri=MO, Kansas=KS, Illinois=IL, Iowa=IA, Arkansas=AR, Nebraska=NE, Oklahoma=OK, Kentucky=KY, or Tennessee=TN.

9. **Zip Code - Location of Pickup**

Definition: Zip code where patient was found or to which unit responded.

Format: Enter the five digit zip code on the line provided.

10. **Type of Run**

Definition: Beginning and ending result of an EMS response.

Discussion and Justification: Allows reports to be generated according to the final disposition of EMS responses. This will provide information about the reasons for which EMS is notified, correlated with the ultimate incident disposition. For instance, it will be of value to know that in certain regions, EMS is frequently activated to see patients who require no treatment nor transport. Reports generated from this data element may be of use in coordinating the dispatch and responder functions as well.

Format: Circle one numbered box under **To Scene** and one numbered box under **From Scene**.

To Scene (determined by dispatcher based on information from caller)

1. Emergency response

This code means the ambulance is dispatched to an unscheduled destination for a possible emergency (a situation resulting from a sudden or unforeseen situation or occurrence that requires immediate action to save life or prevent suffering or disability). This includes all 911 types of calls. This is also the correct code if a patient is stabilized in an emergency department and then needs to be immediately transported to a tertiary care facility, such as a trauma center.

2. Non-emergency response (routine)

This code means the patient did not request and require an immediate response by an ambulance. This would include planned transfers of a stable patient between a nursing home and a hospital or planned morning transfers from one hospital to another hospital.

From Scene (determined at location of patient, based on assessment of patient)

01. Life Threatening, transported to a hospital

This code means the patient suffered a significant or potentially significant compromise of the cardiovascular and/or respiratory system, thus presumably endangering the patient's life if the condition is not reversed in a timely fashion. This code shall always be used for a patient with a Revised Trauma Score less than 12. This is almost always associated with an emergency response to the scene.

02. Urgent, transported to a hospital

This code means the patient's life is not in immediate danger but needs to be transported to an acute care general hospital to prevent further suffering and/or disability. This is almost always associated with an emergency response to the scene.

03. Routine, transported

This code means the patient is in a stable condition and is in need of transportation by ambulance from a hospital to a nursing home or from a nursing home to a hospital for tests. This is almost always associated with a non-emergency response to the scene.

04. Dry run, no patient transported

11. Time Call Received

Definition: Time EMS dispatch is called to respond to an ambulance medical emergency.

Discussion and Justification: Provides the start point of the dispatch component of the EMS response. This data element allows managers to assess delays between the time of incident report and the notification of EMS dispatchers.

Format: Enter the military time in the boxes provided.

12. Time Unit Dispatched

Definition: Time ambulance unit is notified by EMS dispatch.

Discussion and Justification: Permits measurement of the actual responder response or delays. Assists planning of communication resources for individual responders, and allows identification of system delays following the dispatch component of the EMS system.

Format: Enter the military time in the boxes provided.

13. **Time Unit En Route**

Definition: Time that the ambulance unit begins physical motion.

Discussion and Justification: Permits measurement of delay between notification of EMS responder and the actual mobilization of the response unit. This data element refers to physical motion of the responding EMS vehicle, and does not refer to individual EMTs who may respond directly to the scene when notified by individual radio or telephone. For example, if an EMS incident is reported, one EMT may be at home or work and be responsible to go the station which holds the ambulance. Another EMT may be notified and may drive in a private vehicle directly to the scene. The data element entered should be the time that the ambulance actually leaves the station, not the time at which the other EMT drives to the scene in the private vehicle.

Format: Enter the military time in the boxes provided.

14. **Time of Arrival at Location**

Definition: Time ambulance unit stops physical motion at scene (last place that the unit or vehicle stops prior to assessing the patient).

Discussion and Justification: Permits measurement of the time required for the response vehicle to go from the station to the scene. This data element refers to the physical motion of the responding EMS vehicle. If an individual EMT arrives at the scene by private vehicle, that is NOT the value to be entered in this field. Otherwise, system delays in having an equipped vehicle at the scene will fail to be identified.

Format: Enter the military time in the boxes provided.

15. **Time Unit Departs Location**

Definition: Time when the ambulance unit began physical motion from scene.

Discussion and Justification: Permits calculation of scene time by subtracting the time of arrival at scene from the time unit left scene.

Format: Enter the military time in the boxes provided.

16. **Time of Arrival at Destination**

Definition: Time when the ambulance unit with the patient arrives at destination or transfer point.

Discussion and Justification: Permits calculation of the time required to go from the scene to the destination of the response unit. If the patient is transferred from one EMS vehicle to another, then the time of arrival at destination for the first vehicle is the time of arrival or patient contact (or both) for the second agency.

Format: Enter the military time in the boxes provided.

17. **Place of Incident**

Definition: Type of location of incident.

Discussion and Justification: This location refers to the location where the injury occurred, **not** necessarily the origin of the transport. Location type of the incident is important for epidemiologists as well as EMS planners deciding where to allocate EMS resources. The categories in this dictionary are from ICD-9 and are E849 place of occurrence codes. This field is always applicable.

Format: Circle the appropriate numbered box.

0. Home

Includes apartment, boarding house, farm house, home premises, residential house, non-institutional place of residence, private driveway, private garage, private garden, private home, private walkway, swimming pool within private house or garden, and yard of home. Excludes home under construction but not occupied, or institutional place of residence.

1. Farm

Includes farm buildings and land under cultivation. Excludes farm house and home premises of farm.

2. Mine or quarry

Includes gravel pit, sand pit, or tunnel under construction.

3. Industrial place and premises

Includes building under construction, dockyard, dry dock, factory building or premises, garage (place of work), industrial yard, loading platform in factory or store, industrial plant, railway yard, shop (place of work), warehouse, and workhouse.

4. Recreation or sport

Includes amusement park, baseball field, basketball court, beach resort, cricket ground, football field, golf course, gymnasium, hockey field, holiday camps, ice palace, lake resort, mountain resort, playgrounds including school playground, public parks, racecourses, resorts of all types, riding school, rifle range, skating rink, ski resorts, sports ground, sports palace, stadium, public swimming pool, tennis court, or vacation resort. Excludes occurrences in private house, private garden, private swimming pool, or private yard.

5. Street or highway

Includes all public roadways.

6. Public building

Includes any building used by the general public, including airport, bank, cafe, casino, church, cinema, clubhouse, courthouse, dance hall, parking garage, hotel, market, movie theater, music hall, nightclub, office, office building, opera house, post office, public hall, broadcasting station, restaurant, commercial shop, bus or railway station, store, or theater. Excludes home garage or industrial building or workplace. Also includes state, public, and private schools.

7. Residential institution (hospital)

Children's home, dormitory, **hospital**, **nursing home**, jail, home for elderly, orphanage, prison, reform school.

8. Other specified location

Includes beaches, canal, caravan site, derelict house, desert, dock, forest, harbor, hill, lake,

mountain, parking lot, parking place, pond or natural pool, prairie, railway line, reservoir, river, stream, swamp, trailer court, and woods. Excludes resorts.

9. Unspecified location

Includes any location not included in the above classification.

18. Ambulance Personnel License Numbers

Definition: Ambulance personnel license numbers assigned by the Bureau of EMS or other identifiers to show all the personnel on the ambulance vehicle or aircraft during the **transportation** of the patient.

Discussion and Justification: Necessary to identify specific crew members participating in an EMS run. Useful for constructing experience reports, monitoring care rendered by specific providers, and planning educational programs.

Format: Enter the ambulance personnel license number issued by the Bureau of EMS of the person driving the ambulance during the patient transportation phase of the ambulance run in the boxes provided next to **Driver**. If an air ambulance, enter an AP for pilot and the first five letters of the his or her last name.

In the boxes provided next to **Attendant #1**, enter the ambulance personnel license number of the person chiefly responsible for the care and treatment of the patient during the patient transportation phase of the ambulance run.

If there is a third person staffing the ambulance vehicle or aircraft, enter their ambulance personnel license number in the boxes provided next to **Attendant #2**.

If attendant #1 or attendant #2 is a nurse or physician who does not have a license from the Bureau of EMS, enter RN, MD or DO and the first five letters of their last name in the appropriate set of boxes.

19. Vital Signs

Systolic Blood Pressure

Definition: Patient's systolic blood pressure at initial (first) assessment.

Discussion and Justification: Important component of several scoring systems for triage, and permits some assessment of acuity of patient.

Format: Enter the systolic blood pressure in the three boxes provided. For example, a systolic blood pressure of 88 would be entered as 088.

Respiratory Rate

Definition: Unassisted patient respiratory rate expressed as number per minute at initial (first) assessment.

Discussion and Justification: Component of several triage scoring systems and provides some assessment of severity of illness or injury. If a patient is not breathing and requires artificial ventilation, this data element should be coded as 00.

Format: Enter the respiratory rate in the two boxes provided. For example, a respiratory rate of 9 would be entered as 09.

Glasgow Coma Score (Total)

Definition: Patient's total Glasgow Coma Scale (GCS) score at initial (first) assessment.

Discussion and Justification: Valid values are 3 to 15. Important component of several triage scoring systems. Provides information about severity of neurologic disorder.

Format: Enter the GCS in the two boxes provided. The GCS is the sum of the three GCS components. For example, an GCS of 9 would be entered as 09.

20. **Protective Equipment**

Definition: Protective equipment in use by patient at time of injury.

Discussion and Justification: If the EMS responder knows that no safety device was employed, then the data element should be coded as none. If none of the indicated devices was used, the element should also be coded as none. If the data element is not applicable, then this should be coded as such. Finally, if the EMS provider has no information about safety device use and cannot obtain such information from the patient or witnesses, then the data element should be coded as unknown.

Format: See the choices and corresponding numbers on the form.

21. **Factors Affecting EMS**

Definition: Special circumstances affecting the EMS response or delivery of care.

Discussion and Justification: For systems planners who are evaluating response times, this data element provides explanations for delays encountered in the system. For instance, the time to scene would be expected to be prolonged if there was a blizzard, or if gunfire prevented EMS personnel from patient access. If there was no problem with EMS delivery, this data element would be coded as not applicable. Unsafe scene includes presence of gunfire, instances in which police prevented access because of safety concerns, etc. Vehicle problems includes problems with the ambulance vehicle itself, not with other vehicles which might have obstructed traffic.

Format: See the choices and corresponding numbers on the form.

22. **Treatment Authorization**

Definition: Indicates the type, if any, of treatment authorization.

Discussion and Justification: Enables managers of EMS systems to determine the authorization type used for emergency medical care provided on specific EMS runs. This data may be of used for determining legal accountability and for auditing the supervision of EMS systems.

Format: Circle the most appropriate numbered box.

1. On line (radio or telephone)

Immediate physician orders to EMS provider through direct telecommunications such as radio or telephone. Also known as on-line medical direction.

2. On scene

Immediate orders to an EMS provider by a physician at the scene of the medical emergency who has officially assumed responsibility for the management of the prehospital care of the patient.

3. Protocol

A protocol is a written treatment guideline devised by the ambulance service medical advisor which reflects the usual and customary treatment of patients with certain specified conditions; it does not supercede or supplant the authority of the medical control physician to make an appropriate treatment decision on a case by case basis. Protocols are intended to be used by ambulance personnel only in those circumstances when voice contact with a medical control physician cannot be made, or when taking time to do so would jeopardize the health of the patient. In such cases, the ambulance service must contact medical control as soon as possible to advise that protocols were followed. This should be rarely used since Missouri is a strict medical control state.

4. Written orders (patient specific)

Written orders by a physician having on-going or continuing responsibility for the medical care of the patient, to an EMS provider regarding the prehospital care of the patient. The orders must accompany the patient, must be in writing, and must be signed by the responsible physician. Also known as advanced medical directions. Example are "Do Not Resuscitate" orders and transfer orders.

5. Orders refused

The request to provide treatment to the patient from authorized personnel is refused. This should be documented in the narrative.

6. Unknown

Applicable authorization for treatment not recorded or not known by the EMS provider, such as cases where prehospital skills and treatments are applied by an EMS provider based on his training and experience, without knowledge of the existence of applicable protocols. This is a default data entry, to be used when none of the other above data items are recorded.

7. Not Applicable

Citation of authorization is not applicable or indicated, such as in cases where no medical treatments are provided, or no treatments requiring explicit physician authorization are administered.

23. Trauma Assessment

Definition: Clinical description of injury type and body site.

Discussion and Justification: Intended to permit the detailed listing of all injuries sustained by a patient according to injury type and body site of the injury. This a crucial data element which will enable EMS planners to know what types of injuries are incurred by patients using the EMS system. The data element will also be of value in assessing the correspondence between injury assessment in the field and actual injuries as evaluated in medical facilities. A major reason for using ISS related body sites is the ability to compare the hospital inpatient ISS areas with those indicated by the prehospital provider. It is stressed that this data element is supposed to reflect the clinical impression of injury by the EMS personnel, not necessarily the final, correct medical diagnosis.

Format: See the choices and corresponding numbers on the form.

24. Cause of Injury

Definition: External cause of injury.

Discussion and Justification: It is necessary to have a broad taxonomy for defining the external causes of injury. It is recognized that the entire E code list is too cumbersome for field use, and the element may be collapsed into the categories which have been listed below.

Format: Enter the two digit number in the boxes provided that corresponds with the patient's cause of injury.

01. Aircraft related

Includes spacecraft.

02. Bicycle related

Includes any pedal cycle accident. Pedal cycle is defined to include bicycles, tricycles, and excludes any motorized cycles.

03. Bites and venomous stings

Includes bites and stings from venomous snakes, lizards, spiders, scorpions, insects, marine life, or plants. Includes animal bites, including non-venomous snakes and lizards. Subcodes are available to include dog, cat, rat, and other specific bites.

04. Child battering

Includes all forms of child battering and non-accidental injury to children. This code should be entered in all instances in which there is sufficient suspicion by the EMS responder that the responder would be required by law to report the case to the appropriate authorities as a suspected case of child abuse.

05. Drowning

Accidental drowning not related to watercraft use. Includes swimming accidents, bathtubs, etc.

06. Electrocution

Includes accidents related to electric current from exposed wire, faulty appliance, high voltage cable, live rail, or open electric socket. Excludes lightning.

07. Lightning

Excludes falling of an object secondary to lighting, and also excludes injuries from fire secondary to lightning.

08. Excessive cold

Includes cold injury due to weather exposure, or cold produced by man, such as in a freezer.

09. Excessive heat

Includes thermal injuries related to weather or heat produced by man, such as in a boiler room or factory. Excludes heat injury from conflagration.

10. Falls, unintentional

Excludes falls which occur in the context of other external causes of injury, such as fires, falling off boats, or falling in accidents involving machinery.

11. Fire and flames

Includes burning by fire, asphyxia or poisoning from conflagration or ignition, and fires secondary to explosions. Excludes injuries related to machinery in operation, vehicle accidents, and arson.

12. Smoke inhalation

Includes smoke and fume inhalation from conflagration.

13. Firearm, assault

If the EMS responder knows that an intentional assault was involved, then the code should be entered to indicate this.

14. Firearm, self inflicted

If the EMS responder knows that the injury was intentionally self inflicted, then the code should be entered to indicate this.

15. Firearm, unintentional

If the EMS responder knows that the injury was unintentionally inflicted, then the code should be entered to indicate this.

16. Sexual assault/rape

Refers to suspected rape/sexual assault.

17. Stabbing, assault

Includes cuts, punctures, or stabs of any part of the body.

18. Machinery related

Includes all machinery accidents except when machinery is not in operation. Excludes electrocution.

19. Mechanical suffocation

Includes suffocation in bed or cradle (crib death), closed space suffocation, plastic bag asphyxia, accidental hanging, etc.

20. Poisoning, chemical

Includes accidental poisoning by solid or liquid substances, gases, and vapors, which are not included under accidental drug poisoning.

21. Poisoning, drug

Includes accidental poisoning by drugs, medicinal substances, or biological products. Extensive codes are available if an agency wishes to collect specific information.

22. MVC, driver

Motor vehicle collisions in which the patient was a driver of a motor vehicle other than a motorcycle.

23. MVC, front seat passenger

Motor vehicle collisions in which the patient was a front seat passenger of a motor vehicle other than a motorcycle.

24. MVC, rear seat passenger

Motor vehicle collisions in which the patient was a rear seat passenger of a motor vehicle other than a motorcycle.

25. MVC, Pedestrian

Motor vehicle collisions in which the patient was a pedestrian struck by a motor vehicle of any type. Includes individuals on skates, in baby carriages, in wheelchairs, on skateboards, skiers, etc.

26. Motorcycle driver

Motor vehicle collisions in which the patient was a driver of a motorcycle.

27. Motorcycle passenger

Motor vehicle collisions in which the patient was a passenger on a motorcycle.

28. Radiation exposure

Excludes complications of radiation therapy.

29. Water transport related

Includes all accidents related to watercraft. Excludes drowning and submersion accidents unless they are related to watercraft use. Thus, if a person falls out of a boat and drowns, it should be coded within this category.

30. Other known injury**31. Unknown cause of injury**

This code is provided primarily for situations when the cause of injury cannot be determined from the type of injury, location of patient, the patient and other people at the scene. This should be a rare entry.

32. Not applicable

This code should be circled in any case where an external injury code is not applicable, such as when a patient suffers from an illness.

25. Illness Assessment

Definition: Provider's clinical impression which led to the management given to the patient (treatments, medications, procedures).

Discussion and Justification: This data element contains the single clinical assessment which primarily drove the actions of the EMS responder. It should be possible to determine whether the treatments or medications provided match protocols which relate to the clinical impression. When more than one choice is applicable to a patient, the responder should indicate the single most important clinical assessment that drove most of the plan of therapy and management.

Format: See below.

01. Abdominal pain/problems

Includes acute abdomen, painful abdomen, cramps, etc. Does not include abdominal trauma.

02. Airway obstruction

Includes choking, swelling of neck, croup, epiglottitis, foreign body in airway, etc.

03. Allergic reaction

Includes reactions to drugs, plants, insects, etc. Category includes hives, urticaria, wheezing and so forth when suspected of being related to allergy.

04. Altered level of consciousness

Refers to patients with any alteration of consciousness, including patients who appear to be substance abusers or under the influence of drugs or alcohol.

05. Behavioral/psychiatric disorder

Includes all situations in which a behavioral or psychiatric problem was considered the major problem for the EMS responder.

06. Cardiac arrest

All instances in which cardiac arrest occurred, and either death was pronounced immediately, or external cardiac massage was instituted. Enter the time of cardiac arrest in the boxes provided.

07. Cardiac rhythm disturbance

Includes any rhythm disturbance which was noted on physical examination or with a cardiac monitor, when the rhythm was the major clinical reason for care rendered by the EMS responder.

08. Chest pain/discomfort

Includes patients with complaint of chest pain, including pain felt related to heart disease, upset stomach, or muscle pain in the chest wall. If an agency has different protocols for different types of chest pain, then this code should be separated out according to the types of protocols.

09. Diabetic symptoms

Relates to patients with symptoms relatable to diabetes, generally when there is a history of diabetes in the patient. The major symptom is hypoglycemia, but in circumstances where diabetes is known to exist, this category can include ketoacidosis, as well as other complications of diabetes.

10. Hyperthermia

When hyperthermia is the major clinical assessment driving EMS responder care.

11. Hypothermia

Usually relates to environmental hypothermia, such as following submersion in cold water, avalanches, or other environmental exposure situations.

12. Hypovolemia/shock

Patients with clinical shock, usually felt to be hypovolemic. All patients considered to have shock by EMS responders should be coded with this code, as it is relatively difficult to identify other less common forms of shock outside the hospital setting.

13. Inhalation injury (toxic gas)

Excludes smoke inhalation.

14. Poisoning/drug ingestion

Includes drug ingestion which are inappropriate drugs or overdoses, as well as poisonings from chemicals. Toxic gases should be coded as inhalation injury.

15. Pregnancy/OB delivery

Includes all aspects of obstetric care rendered in the prehospital setting.

16. Respiratory arrest

Instances in which the patient stops breathing. These patients always require ventilatory support on at least a temporary basis.

17. Respiratory distress

Includes patients with respiratory distress who continue to have spontaneous breathing and never suffer respiratory arrest. These patients may require ventilatory support.

18. Seizure

Includes major and minor motor seizures.

19. Smoke inhalation

Smoke inhalation encountered in conflagration setting.

20. Stroke/CVA

Cerebrovascular accidents, strokes, TIA.

21. Syncope/fainting

Fainting is the major clinical assessment, even though the patient may be fully awake at the time of EMS evaluation.

22. Vaginal hemorrhage

Refers to abnormal vaginal bleeding in sufficient amount to have driven the EMS response. When pregnancy is involved, vaginal hemorrhage should be coded when the hemorrhage itself was the major concern to the EMS responder.

23. Other

Use this code when no other categories apply and describe on line provided.

24. Unknown

Use this code when there is not enough information to determine the clinical impression of the EMS responder. This should be a very rarely used code.

25. Not applicable

Use this code when the patient is injured.

26. Destination Determination

Definition: Reason a transport destination was selected.

Discussion and Justification: Helps EMS managers to determine whether the choice of destination is appropriate. Items which are defined as patient, physician, or family choice are of interest to determine whether a trauma or referral system is functioning well, or is frequently overridden by non-medical issues.

Format: See the choices and corresponding numbers on the form.

27. Treatment

Definition: Identification of procedures attempted or performed on the patient.

Discussion and Justification: Intended to provide planners and educators with information on all procedures conducted in the field, by whom, and for what indications. Procedures are defined here as anything done by way of assessment or treatment of the patient.

Format: See the choices and corresponding numbers on the form. The odd numbered box should be circled when the person shown as the driver performed the treatment. The even numbered box should be circled when the person shown as attendant #1 performed the treatment. Air ambulance personnel will use the odd numbered boxes for treatment performed by attendant #2. See definition of driver, attendant #1 and attendant #2 under ambulance personnel license numbers.

15 or 16. If defibrillation, enter the initial number of watt seconds, and number of attempts.

31 or 32. If extrication, enter the military time that it occurred.

35 or 36. If glucose test, enter the mg/dl (milligrams per deciliter).

39 or 40. If I.V. administered or I.V. failed, enter number of I.V.s that were successfully administered and/or the number of attempts that failed.

47 or 48. If intraosseous infusion, enter the number of infusions successfully completed.

57 or 58. If oxygen by cannula or oxygen by mask, enter the number of (lpm)

59 or 60. liters per minute.

28. **Patient Information**

Patient Name

Definition: Patient name.

Discussion and Justification: Essential because of its value in probabilistic linkage, both as a linking variable as well as a confirmatory variable to determine appropriate linkage.

Format: Enter the last name, first name and middle initial of the patient on the line provided.

Patient Street Address

Definition: Patient's street address.

Discussion and Justification: Useful for determining the political entity responsible for potential public health interventions, payment for services, etc.

Format: Enter the patient's street address of residence on the line provided.

City of Residence

Definition: Patient city or township of residence.

Discussion and Justification: Useful for determining the political entity responsible for potential public health interventions, payment for services, etc.

Format: Enter the patient's city of residence on the line provided.

County of Residence

Definition: Patient county of residence.

Discussion and Justification: Useful for determining the political entity responsible for potential public health interventions, payment for services, etc.

Format: Enter the patient's county of residence on the line provided.

State of Residence

Definition: State where patient resides.

Discussion and Justification: Provides a means of aggregating EMS incidents by state, which allows reports to state legislatures concerning statewide EMS activities. Can be used to assess statewide resource requirements for EMS operations.

Format: Enter the patient's state of residence using a two digit abbreviation on the line provided. For example, Missouri=MO.

Zip Code of Residence

Definition: Zip code of patient's residence.

Discussion and Justification: Useful for determining the political entity responsible for potential public health interventions, payment for services, etc.

Format: Enter the patient's five digit zip code of residence on the line provided.

Date of Birth

Definition: Patient's date of birth.

Discussion and Justification: Extremely valuable for probabilistic linkage and calculation of accurate age information. Provides much more discriminatory power in probabilistic linkage than the numeric age.

Format: Enter two digits for the month, followed by two digits for the day followed by four (4) digits for the century and year in the boxes provided. For example, if the patient was born on September 12, 1946, it should be recorded as 09121946.

Race

Definition: Patient's race.

Discussion and Justification: Useful for epidemiological studies, and of importance to data systems in order to access certain types of Federal or state funds which are directed to specific races.

Format: See the choices and corresponding numbers on the form.

Sex

Definition: Sex of patient.

Discussion and Justification: Valuable for linkage to other files, and permits reporting of epidemiological information by sex.

Format: See the choices and corresponding numbers on the form.

29. **Patient Destination**

Definition: Health care facility, ambulance service, home, etc. that received patient from EMS responder providing this record.

Discussion and Justification: Allows reporting by destination facilities, and allows linking when a patient is transferred between EMS responder agencies. This data element is very valuable for probabilistic linkage. For instance, when an EMS responder indicates a specific hospital, this can greatly facilitate linkage to outpatient and inpatient facility records.

Format: Name of hospital, nursing home, clinic, etc. that the patient is transported to by the ambulance unit completing this report. If rendezvousing with another ambulance unit, enter the name of the ambulance service that is completing the transportation of the patient. If the destination is the patient's home, enter home.

30. **Narrative**

Definition: A written record of the patient's condition, procedures rendered, and changes in the patient's condition.

Format: Enter the patient's chief complaint, medical history, prescription medications, and allergies on the lines provided. Do not repeat other information that is readily shown on the form, such as age, race, sex, etc. Supplemental narrative forms may be developed by the ambulance service and attached to the MARF if needed. (Please do not use a separate state MARF for an additional narrative.)